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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/062,830	01/31/2002	Jarno Marchetto	3282/0K042	4350
25096 PERKINS COI	7590 10/26/200 E LLP	EXAMINER		
PATENT-SEA		NAWAZ, ASAD M		
P.O. BOX 1247 SEATTLE, WA 98111-1247			ART UNIT	PAPER NUMBER
,			2155	
			MAIL DATE	DELIVERY MODE
			10/26/2007	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

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	Application No.	Applicant(s)			
Office Action Comment	10/062,830	MARCHETTO ET AL.			
Office Action Summary	Examiner	Art Unit			
	Asad M. Nawaz	2155			
The MAILING DATE of this communication app Period for Reply	pears on the cover sheet with	the correspondence address			
A SHORTENED STATUTORY PERIOD FOR REPLY WHICHEVER IS LONGER, FROM THE MAILING D. - Extensions of time may be available under the provisions of 37 CFR 1.1 after SIX (6) MONTHS from the mailling date of this communication. - If NO period for reply is specified above, the maximum statutory period of Failure to reply within the set or extended period for reply will, by statute Any reply received by the Office later than three months after the mailing earned patent term adjustment. See 37 CFR 1.704(b).	ATE OF THIS COMMUNICA 36(a). In no event, however, may a reply will apply and will expire SIX (6) MONTHS, cause the application to become ABAN	TION. / be timely filed S from the mailing date of this communication. DONED (35 U.S.C. § 133).			
Status					
1)⊠ Responsive to communication(s) filed on 8/1/0)7 .				
2a)⊠ This action is FINAL . 2b)□ This action is non-final.					
Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213.					
Disposition of Claims					
4) ⊠ Claim(s) 1-8 and 11-20 is/are pending in the a 4a) Of the above claim(s) is/are withdray 5) □ Claim(s) is/are allowed. 6) ⊠ Claim(s) 1-8 and 11-20 is/are rejected. 7) □ Claim(s) is/are objected to. 8) □ Claim(s) are subject to restriction and/or	wn from consideration.				
Application Papers					
9)☐ The specification is objected to by the Examine	er.				
10) ☐ The drawing(s) filed on is/are: a) ☐ acc	epted or b) ☐ objected to by	the Examiner.			
Applicant may not request that any objection to the	- · ·	, <i>,</i>			
Replacement drawing sheet(s) including the correct 11) The oath or declaration is objected to by the Ex	- ·	•			
Priority under 35 U.S.C. § 119					
12) Acknowledgment is made of a claim for foreign a) All b) Some * c) None of: 1. Certified copies of the priority document 2. Certified copies of the priority document 3. Copies of the certified copies of the priority application from the International Bureau * See the attached detailed Office action for a list	s have been received. s have been received in App rity documents have been re- u (PCT Rule 17.2(a)).	lication No ceived in this National Stage			
Attachment(s)					
 Notice of References Cited (PTO-892) Notice of Draftsperson's Patent Drawing Review (PTO-948) Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date 3 (21101)	_	amary (PTO-413) Mail Date mal Patent Application			

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*DETAILED ACTION

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1. This action is responsive to the arguments received on 8/1/07. No new claims have been added and no claims have been canceled. Claims 1-8 and 11-20 are pending.

Claim Rejections - 35 USC § 103

- 2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 3. Claims 1-8 and 11-20 rejected under 35 U.S.C. 103(a) as being unpatentable over as being taught by Wang et al. (USPN: 5,867,230) further in view of Cooper et al. (USPN: 6,681,255).

As to claim 1, Wang teaches a method of using controlling the wait time Ow) between the start of transmission of successive packets of known packet size (P) of a content to be transmitted to achieve a target bandwidth (BT) during the transmission comprising the steps of: selecting a target bandwidth (BT) sought to be achieved during the transmission (col 1, line 64 to col 2, line 3; a target data rate is selected); and controlling the transmission of the packets using so that there is a residual time (t) between the end of transmission of one packet and the start of transmission of the next packet to establish the wait time tw (col 4, lines 42-57; col 5, lines 50-67; the logic controls the frame to be encoded by a plurality of variables).

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However, Wang et al does not explicitly indicate computing a wait time (tw) between the start of successive packets of the transmission using the algorithm tw=P/Br.

Cooper et al teach that a wait time is calculated by dividing a packet size (called bytes AGG) by the targeted bandwidth. Also, a residual time equaling to the end of transmission of one packet and the start of the next is factored in (Figs 3 and 4; col 5, lines 1-42).

It would have been obvious to one of ordinary skill in the art at the time of the invention to incorporate the teachings of Cooper et al into those of Wang et al to effectively manage the network. Controlling the bandwidth and maintaining a desired rate would allow the administrator to effectively manage QoS requirements while providing a balance of availability and efficiency.

As to claim 2, Wang et al teaches the method as claimed in claim 1 wherein the residual time t that is used is rounded to a time unit (col 5, lines 38-46; times are rounded to preset limits).

As to claim 3, Wang et al teaches the method as claimed in claim 2 wherein the rounding to the time unit is accomplished by a counter (col 5, lines 38-46).

As to claim 4, Wang et al teaches the method as claimed in claim 5 wherein the time tused is determined by: determining the start time t1 of transmission of a packet,

determining the end time t2 of transmission of the packet, and determining the time used tused in transmitting the packet as t2 - t1 (col 6, lines 50-7).

As to claim 5, Wang et al teaches the method as claimed in claim 4 wherein the step of controlling further comprises the steps of: determining a time used (tused) in the transmission of a packet and waiting the residual time t between the end of transmission of one packet to the start of transmission of the next packet (col 4, lines 42-57; col 5, lines 50-67; the logic controls the frame to be encoded by a plurality of variables).

As to claim 6, Wang et al teaches the method as claimed in claim 5 further comprising the step of repeating steps (a) and (b) for each packet transmitted (abstract).

As to claim 7, Wang teaches a method as in claim 1 wherein the controlling of the transmission of the packets with a residual time t between successive packets is comprised of: determining a value of start time tstart, of sending a packet and a current time tnow, performing a loop operation of:

- (a) computing a time telapsed = tnow tstart,
- (b) comparing telapsed to the residual time t and transmitting the next packet when the value of telapsed t (refer to Fig 4; col 4, lines 8-16; col 5, lines 38-46; col 6, line 31).

As to claim 8, Wang teaches the method as claimed in claim 7 further comprising the steps of computing an error value = telapsed – t and subtracting the value from a later supplied value of t (col 1, lines 24-57).

As to claim 11, Wang teaches the method of claim 1, including the additional step of selecting the known packet size (P) of the packets to be transmitted (see Fig 6).

As to claim 12, Wang teaches the method of claim 1 wherein the known packet size (P) is provided by an application (see Fig 6).

Claims 13-20 are essentially the apparatus of the above-mentioned method claims and present no new limitations. Thus, they are rejected under similar rationale.

Response to Arguments

4. Applicant's arguments filed have been fully considered but they are not persuasive. Applicant argues in substance that A) the present invention institutes a consistent time delay between the start of successive packets until the data has been completely transmitted B) contrary to the lower compression rates, the target rate is a function of the amount of data to be transmitted and C) the bytesagg divided by target bandwidth is not the same as number of bits within each packet divided by target bandwidth.

In response to A), these limitations are not found in the claims. Although the claims are interpreted in light of the specification, limitations from the specification are not read into the claims. See *In re Van Geuns*, 988 F.2d 1181, 26 USPQ2d 1057 (Fed. Cir. 1993).

In response to B), by compressing data, one is controlling the amount of data to be transmitted. Therefore, this is equivalent to the target rate which is "a function of the amount of data to be transmitted". Therefore, Wang in view of Cooper still meet the scope of the invention as currently claimed.

In response to C), the aggregate bytes is equivalent to the applicant's variable.

Aggregate means to combine or the total bytes while the applicant claims similarly the number of bits within each the packets. Therefore, Wang in view of Cooper still meet the scope of the invention as currently claimed.

Conclusion

5. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

6. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Asad M. Nawaz whose telephone number is (571) 272-3988. The examiner can normally be reached on M-F 8-4:30.

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If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Saleh Najjar can be reached on (571) 272-4006. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

AMN

OUDED TO BY PATENT EXAMINER